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Colombia continues to make progress on biotechnology adoption

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Report Highlights:
Colombian agricultural groups strongly support adoption of biotechnology, while some environmental groups have raised limited concerns. Over the past 12 months, Colombia has made significant progress in making favorable recommendations on living modified organisms (LMO) for human consumption. The Ministry of Social Protection has issued resolutions approving some transgenic events, but there are still several pending proposals. Labeling legislation has been postponed in Congress, but it continues to be a source of concern. Timid attempts to use animal biotechnology in human and animal health are underway by both academia and the private sector.

Section I. Executive Summary:
Colombia is the largest market for U.S. agricultural products in Central and South America and is one of the top seven markets for U.S. corn. To date, Colombian biotechnology regulations do not

impede commercial U.S. exports.

The Colombian legal framework for mandating biotechnology regulations for agricultural products is under continual review. Colombia approved the Cartagena Protocol on Biosafety in 2002. In 2005, Decree 4525 was published to implement the Protocol, and since then, several other Ministerial resolutions were published to outline specific requirements and procedures for approving and using LMO products. To some extent, Colombia's biotechnology regulations are still a work in progress, which provides an opportunity to develop training activities that will facilitate the adoption of science-based regulations. Colombia has created three technical biotechnology committees to analyze environmental, biosafety and food safety impact of biotechnology products. In the last two years, select congressmen have unsuccessfully submitted a proposed law mandating LMO product labeling on select LMO products.

Prior to 2006, the only LMO products planted on a non-restricted commercial basis in Colombia were Bollgard and Roundup-Ready cotton varieties. In February 2007, the Colombian Government approved Bollgard/Roundup-Ready cotton, the first stacked LMO product. In addition, the GOC has approved plantings of LMO corn for limited commercial use. Biotech blue carnations continue to be approved for commercial production, but only for export. There are pending license applications for several other crops that are in varying phases of approval (see appendices A and B). In 2008, Colombia planted 43,004 hectares of LMO commodities, up from 3,000 hectares in 2003. There has been a major increase in plantings of stacked events and LMO corn. There is a pending legal issue with LMO cotton that affected 13% of the crop last year.

Regarding animal biotechnology, Colombia has done some work on animals aimed at developing cattle and sheep as well as laboratory research for human health.

Section II. Biotechnology Trade and Production:

Area planted to LMO cotton increased from 6,187 hectares in 2003, to 28,000 hectares in 2008, which represented 70% of total area planted to cotton in 2008, 27 percent more than in 2007. It is worth mentioning that 85 percent, 24,000 hectares, was planted to stacked cotton varieties (resistant to some lepidopterous and tolerant to Roundup herbicide). This means a dramatic increase with respect to only 2 percent planted area with stacked cotton in 2007. In addition to LMO cotton, 15,000 hectares of LMO corn were planted in 2008 which represented an increase of 150 percent with respect to 2007. Given the high commodity prices and the current world food security situation, a better environment for plantings of LMOs is expected. Dutch blue carnations continue to be produced under greenhouse conditions for export to Europe. Only 4 hectares of blue carnations were produced in 2008.

In addition to the above-mentioned LMO events, Colombia is currently working on several biotechnology crops for regulatory approval. Information indicates that Flower Development, a private Dutch company, is working on roses with blue petals. (See Appendices A and B).

Due to the fact that Colombia has not developed any biotechnology crops as of this date, LMO seeds are imported mostly from the United States and occasionally from South Africa, Argentina and Australia. See Appendices A and B for more details. There are several Colombian organizations

conducting specific research projects. The sugar cane research center (Cenicana) is looking to develop a sugar cane variety resistant to the yellow leaf virus; the International Center for Tropical Agriculture (CIAT) is working on rice, grazing grass, and cassava; and the Coffee Research Center (Cenicafe) is working on a coffee variety that is resistant to coffee borer (broca).

Section III. New Technologies:

Colombia has done some work on animal biotechnology for developing pharmaceuticals and vaccines to be used in humans and animals. Reportedly, research is in the first stages according to Government officials who have informed that there has only been an informal request on information for submitting a proposal on bovine production of free lactose milk. With respect to human health, academia has submitted 3 proposed research projects on the use of LMO mice for health purposes. There is only one pending for approval. See appendix B. There are other private sector research groups that are working on the area. However, no further developments have been reported.

The Government of Colombia has established a regulatory framework for plant biotechnology that applies to animal biotechnology as well. The three interagency committees that are responsible for evaluation and approval of plant biosafety issues are the ones dealing with animal issues.

Biotechnology is mostly related to plants. Thus, animal biotechnology is not well known to the public and therefore is not an issue of controversy.

Section IV. Biotechnology Policy:

The Ministry of Agriculture is a strong supporter of agricultural biotechnology and as such, is developing a regulatory framework to implement the Cartagena Biosafety Protocol. The Cartagena Protocol specifically focuses on trans border movement of any LMO resulting from modern biotechnology that may have adverse effects on the conservation and sustainable use of biological diversity. Colombia approved the Biosafety Protocol, Law 740 in 2002, which became fully enforced in September 2003. As of today, regulations to implement the above mentioned law are outlined in decree 4525 of December 6, 2005; Colombian Agricultural Institute (ICA) resolution 1063 of March 22, 2005; ICA resolution 000946 of April 17, 2006; and Ministry of Social Protection resolution 0227 of February 1, 2007. The following entities are responsible for biotechnology risk assessments:

1. Ministry of the Environment, Housing and Territorial Development.
2. Ministry of Social Protection.
3. Ministry of Agriculture and Rural Development.
4. Colciencias (Colombian Entity for the Development of Science and Technology).
5. National Institute for the Surveillance of Food and Medicines (INVIMA).
6. Colombian Agricultural Institute (ICA).

Decree 4525 of December 6, 2005, established three interagency committees composed of the above-mentioned entities that are responsible for evaluation and approval of biosafety issues:

National Technical Committee for Agriculture, Fishery, Forestry and Agro-industry (CTN-Bio): The committee's role is to assess LMO events for the listed sectors. The committee has been historically slow in approving new-to-market LMO products creating problems for U.S. seed exports. In order to be approved, each variety with a specific gene must go through a lengthy approval process with rigid step-by-step procedures. Colombia allows field-testing for biotechnology crops (see Appendix A) after a risk assessment is submitted to CTN-Bio. The time taken to conduct the risk assessment varies: all dissenting concerns by the different ministries must be resolved before a product is approved.

Regarding "stacked" events, CTN-Bio requires running the field-testing again as if the seed were a completely new variety. Even though the individual traits were already accepted, the "stacked" variety has to begin the process all over. In addition, the coexistence between biotechnology and non-biotechnology crops in Colombia does not have a written regulation. However, ICA has carried out an evaluation of cross-pollination on cotton and found that both LMO and non-LMO crops may coexist. Nevertheless, farmers continue to use buffer areas (a natural barrier of fallow terrain between the two plantings). On labeling, ICA resolutions 3492 of December 22, 1998 and 2935, October 23, 2001 were superseded by ICA resolution 946 of April 17, 2006, which requires labeling biotechnology materials (seeds or other plant reproductive materials and animal products). It should read in Spanish: "ORGANISMO MODIFICADO GENETICAMENTE". The requirement is justified as being needed consumer information.

National Technical Committee for Environment (CTN-Environment). The committee function is to assess biotechnology events for introduction of LMO events that impact the environment. This CTN is not yet operational.

The National Technical Committee for Health and Human Nutrition (CTN-Health): CTN-Health's function is to assess the impact of genetically modified events in LMO products and by-products on human health. On February 1, 2007, the Ministry of Social Protection issued resolution 0227 to establish the functions of the committee making it fully operational. In fact, CTN-Health has submitted 29 recommendations of approval to the Ministry of Social Protection, who has issued 9 resolutions. Such is the case of LLRice62 and 601. Although the Ministry of Social Protection is not keeping the pace of the CTN Health, we have seen some improvements with respect to last year where the Ministry did not issue any approval resolutions. Regarding labeling, CTN-Health has not implemented any labeling requirement on finished packaged foods and feeds as of this date. However, select congressmen resubmitted a proposed law mandating LMO product labeling on select LMO products which has only reached the committees, but it was defeated. It is unlikely that it will be presented in the upcoming legislature, beginning on July 20.

Although Colombia's approach to biotechnology has been favorable, some environmental groups are pressing government officials to reject biotech products. In addition, some indigenous groups have been inspired by NGOs to oppose the introduction of LMOs based on land tenure and biodiversity concerns. The GOC's structure for biotechnology regulations is based on science-based decisions of accepting or rejecting new biotechnology events. The basic principle is to adopt the technologies that may help the economic/social development of Colombia. The Ministry of Environment has been the most controversial voice on biotechnology approvals.

In late 2008, the cotton crop in the Northern Coast was damaged by a pest outbreak which was supposed to have been controlled by DP 164 seed sold by Monsanto. This caused an estimated 13 percent loss, according to cotton producers. However, Monsanto blames the erratic weather conditions prevailing during the growing period. The controversy is to be resolved in court. In the meantime, the GOC issued resolution 682 demanding LMO seed companies to adopt a life cycle stewardship approach to accompany producers. Unfortunately, this incident has provided grounds to NGO's opposing biotechnology.

Section V. Marketing:

Biotechnology has been in Colombia for the last 15 years, but regulations are a relatively new issue. Most press coverage is favorable to biotechnology. To date consumers have not voiced any concerns about biotechnology products or products containing biotechnology raw materials. There are no commercial barriers related to biotechnology products. Regarding biotechnology fees, the Government of Colombia does not have legislation in place to collect technology fees. The upcoming cotton plantings in the Northern Coast for harvest in late 2009 will definitely measure the impact of the past 2008 incident with respect to expanded adoption of biotechnology by farmers.

Section VI. Capacity Building and Outreach:

Since Colombia is in the process of developing LMO regulations, FAS/Bogota has been working together with different groups to disseminate information on the benefits and to expand the application of agricultural biotechnology. Keeping this in mind, FAS has carried out the following activities in the previous years:

- September 2003: Three leading Colombian journalists attended a biotechnology tour in the United States.
- July 2004: Two Colombian officials attended a two-week "Biotech Short Course" on regulatory and trade issues at Michigan State University.
- August 2004: Farmer-to-Farmer Biotechnology Workshop at the University of Zamorano in Honduras. A leading Colombian cotton producer and agricultural leader attended.
- February, 2006: a Cochran candidate attended a tailor-made program in the United States on biotechnology.
- July 23-25, 2007: FAS and State jointly sponsored a biotechnology conference for Government officials held in Bogotá and followed by meetings with research organizations in Cali.
- September, 2007: 2 Cochran candidates from INVIMA attended biotechnology training in Washington, St. Louis and Texas A&M.
- September, 2008: FAS and State jointly sponsored a seminar for government officials, private sector, academia and producers associations to address issues regarding labeling of LMO products, the implementation of the Cartagena Biosafety Protocol and environmental concerns.
- September, 2008: FAS supported Agrobio (an association of private companies producing biotechnology products) in an effort to educate Latin American researchers on LMO monitoring and detection.

Section VII. Author Defined:
While Colombia has made significant progress in opening its markets to biotechnology products, it can still greatly benefit from additional collaborations in the areas of developing risk-assessment policies and procedures and developing biotech-friendly regulations.

In the week of September 21, 2009, FAS and the US grains Council are planning to take two or three Colombian regulators to visit regulators in Washington, D.C. for a couple of days and then visit Iowa for two to three days, to see biotechnology risk-management practices in the field.

In August/September 2010, USDA and Monsanto will lead a delegation of Colombian congressmen and staffers to attend the Farm Progress 2010 Show that will include visiting biotechnology crops and one-on-one meetings with Washington Government officials.

Section VIII. Follow-up Activities
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Section IX. Reference Material

Government

ICA- Colombian Agricultural Institute
www.ica.gov.co
Ministry of the Environment, Housing and Territorial Development
www.minambiente.gov.co
Ministry of the Social Protection
www.minproteccionsocial.gov.co
Ministry of Agriculture and Rural Development
www.minagricultura.gov.co
Colciencias (Colombian Entity for the Development of Science and Technology)
www.colciencias.gov.co
National Institute for the Surveillance of Food and Medicines (INVIMA)
www.invima.gov.co

Private Sector

Agrobio
www.agrobio.org

Other Research Institutes

CIAT (the International Center for Tropical Agriculture)
www.ciat.cgiar.org
Cenicaña (the sugar cane research center)
www.cenicana.org
Cenicafe (the Coffee Research Center)
www.cenicafe.org

APPENDIX A. COLOMBIA: CURRENT STATUS OF BIOTECHNOLOGY PRODUCTS

Crop	**Requesting Company**	**New Characteristics of Biotechnology**	**Authorized Activity**
Carnation	Flores Colombianas Ltda. (Holland)	Blue Carnation	Approved in 2000 for commercial production of cut flowers for exports only. (green house conditions).
Carnation ICA resolution 3932, 2008	Flower Development (Holland)	Blue Carnation	Approved in 2008 for commercial production of cut flowers for exports only. (green house conditions).
Roses	Flower Development (Holland)	Blue Petal Roses	Approved for biosafety studies per risk assessment in 2005 (green house conditions).
LLCotton25 ICA resolution 1037, 2009	Bayer CropScience	Tolerant to amonium glufosinate	Approved for agronomic field trials in the dry and humid Caribbean regions, upper Magdalena river (Tolima, Huila), Cauca river valley and eastern plains.
Bollgard Cotton	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects.	Approved for commercial plantings since 2004 in the humid Caribbean region, the upper Magdalena river valley(Tolima and Huila) and Cauca river

			valley. Approved for commercial plantings in the dry Caribbean region in May, 2004.
Roundup Ready Cotton	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide.	Approved in 2004 for commercial plantings in the dry Caribbean and humid Caribbean regions. Approved in 2007 for commercial plantings in the upper Magdalena river valley(Tolima and Huila) and Cauca river valley.
Bollgard/Roundup Ready Cotton	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects and completely tolerant to Roundup herbicide.	Approved in 2007 for commercial plantings in the upper Magdalena river valley(Tolima and Huila) and Cauca river valley.
Bollgard II and Roundup Ready Flex Cotton	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects and completely tolerant to Roundup herbicide.	Approved in 2006 for commercial plantings
Roundup Ready Flex Cotton	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide	Approved for biosafety studies.
Rice	CIAT (Colombia)	Resistant to White Leaf virus	Approved in 2000 for restricted research and small-scale plantings in open fields, in accordance with risk assessment.
Cassava	CIAT (Colombia)	Resistant to the borer of stem/stalk	Approved in 2000 for small-scale plantings in open fields per risk assessment.
Cassava	CIAT (Colombia)	Modification of cytokine production	Approved in 2000 for restricted research per risk assessment.
Cassava	CIAT (Colombia)	Modification of amilopectin production	Approved in 2000 for restricted research per risk assessment.
Cassava	CIAT (Colombia)	Modification of cyanide content	Approved in 2000 for restricted research per

			risk assessment.
Brachiaria (grass)	CIAT (Colombia)	"frog hopper" resistant	Approved in 2000 for restricted research per risk assessment
Coffee	CENICAFE (Colombia)	Borer resistant	Approved in 2000 for restricted research per risk assessment.
Sugar cane	CENICAÑA (Colombia)	Resistant to the yellow leaf syndrome	Approved in 2003 for restricted research and small-scale plantings in open fields per risk assessment.
Yieldgard Corn ICA Resolution 3743, 2008	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects	Approved in 2007 for commercial plantings in the humid Caribbean region, upper Magdalena river (Tolima, Huila), Cauca river valley and eastern plains. Approved in 2008 for commercial plantings in the dry Caribbean and the Coffee region.
Yieldgard Corn ICA Resolution 3742, 2008	Dupont (United States)	Resistant to some lepidopterous insects	Approved in 2008 for commercial plantings in the dry Caribbean and the Coffee region.
Yieldgard 2	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects and tolerant to Roundup herbicide	Risk assessment since 2005.
Yieldgard VTPro Corn	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects	Approved in 2007 for biosafety field trials in the dry and humid Caribbean regions, the Coffee region, upper Magdalena river valley (Tolima, Huila), Cauca river valley and eastern plains.
Roundup Ready Corn (RR 2 corn)	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide.	Approved in 2007 for commercial plantings in the humid Caribbean

ICA resolution 3740, 2008			region (Cordoba), upper Magdalena river valley (Tolima, Huila), Cauca river valley and eastern plains. Approved in 2008 for commercial plantings in the dry Caribbean and the Coffee region.
Roundup Ready Corn ICA Resolution 3739, 2008	Dupont (United States)	Tolerant to Roundup herbicide.	Approved in 2008 for commercial plantings in the dry Caribbean and the Coffee region.
Yieldgard VTPro X Roundup Ready 2 corn ICA resolution 1036, 2009	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects and tolerant to Roundup herbicide.	Approved in 2009 for biosafety trials and agronomic assessment in the dry and humid Caribbean regions, upper Magdalena river valley (Tolima, Huila), Cauca river valley and eastern plains.
Yieldgard Roundup Ready Corn ICA resolution 3744, 2008	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects and tolerant to Roundup herbicide	Approved in 2007 for commercial plantings in the humid Caribbean region (Cordoba), upper Magdalena river valley (Tolima, Huila), Cauca river valley and eastern plains. Approved in 2008 for commercial plantings in the dry Caribbean and the Coffee region.
Herculex I Corn ICA resolution 3741, 2008	Dupont (United States)	Resistant to some lepidopterous insects	Approved in 2007 for biosafety field trials in the dry Caribbean. Approved in 2007 for commercial plantings in the humid Caribbean region (Cordoba), upper Magdalena river valley (Tolima, Huila), Cauca river valley and eastern plains. Approved in 2008 for commercial

			plantings in the coffee region.
Herculex I X Roundup Ready corn ICA Resolution 3745, 2008	Dupont (United States)	Resistant to some lepidopterous insects and tolerant to Roundup herbicide	Approved for commercial plantings in the humid Caribbean region, Cauca river valley and eastern plains. Approved in 2008 for commercial plantings in the coffee region.
Herculex I X Roundup Ready corn ICA Resolution 3738, 2008	Dow AgroSciences de Colombia S.A.	Resistant to some lepidopterous insects and tolerant to Roundup herbicide	Approved in 2008 for commercial plantings in the coffee region.
Bt 11 corn	Syngenta (Switzerland)	Resistant to some lepidopterous insects	Approved in 2005 for biosafety trials in the humid Caribbean region, Cauca river valley and Meta.
CCR corn	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide and resistant to rootworm.	Approved for biosafety trials.
GA 21 corn	Syngenta (Switzerland)	Tolerant to Roundup gene epsps	Approved for biosafety trials.
Potatoes	Corporacion de Investigaciones Biologicas (CIB) (Colombia)	Resistant to some lepidopterous insects	The National Biosafety Committee postponed the study of risk assessment.
Roundup Ready soybean ICA resolution 1035, 2009	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide.	Approved in 2009 for biosafety field trials in the dry and humid Caribbean regions, upper Magdalena river valley (Tolima, Huila), Cauca river valley and eastern plains

APPENDIX B. COLOMBIA: CURRENT STATUS OF BIOTECHNOLOGY PRODUCT APPLICATIONS FOR FOOD, FEED AND HEALTH

Crop/Event	**Requesting Company**	**New Characteristics of**	**Approved Applications**	**Approval Date**

		Biotechnology		
Bollgard cotton	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects	Raw material for food and feed	06/24/2004 06/08/2003
Roundup Ready cotton	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide	Raw material for food and feed	11/12/2003 10/27/2003
Bollgard II cotton	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects	Raw material for feed	Pending Ministry of Social Protection's approval for food since 10/24/2008
Roundup Ready Flex cotton	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide and to a wider spectrum of weeds	Raw material for feed	Pending Ministry of Social Protection's approval for food since 08/01/2008
Bollgard II+Roundup Ready Flex cotton	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects, tolerant to Roundup herbicide and to a wider spectrum of weeds	Raw material for feed	Pending Ministry of Social Protection's approval for food since 01/29/2009
Bollgard+Roundup Ready cotton	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects and tolerant to Roundup herbicide	Raw material for food	Approved on 06/16/2008
Yieldgard corn	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects	Raw material for food and feed	10/27/2003 02/26/2004
Roundup Ready corn	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide	Raw material for food and feed	03/29/2004 12/15/2006
Yieldgard Rootworm Corn CRW	COACOL-Monsanto (United States)	Resistant to rootworm		Pending ICA's approval for feed. Pending Ministry of Social Protection's approval for food since 06/27/2008
Yieldgard+Roundup Ready Corn	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects and tolerant	Raw material for feed.	Approved for feed on 06/04/2007.

		to Roundup herbicide		Pending Ministry of Social Protection's approval for food since 10/01/2007
Bt Herculex I Corn	Dupont (United States)	Resistant to some lepidopterous insects	Raw material for food and feed.	Approved on 10/17/2006 12/15/2006
Herculex I X Roundup Ready corn	Dupont (United States)	Resistant to some lepidopterous insects and tolerant to Roundup herbicide		Pending Ministry of Social Protection's approval for food since 10/24/2008
Herculex RW corn	Dupont (United States			Pending Ministry of Social Protection's approval for food since 01/29/2009
Yieldgard+Lysine corn	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects. High lysine content	Raw material for feed	Pending Ministry of Social Protection's approval for food since 09/26/2008
Yieldgard II corn	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects	Raw material for feed	Approved for feed.
Yieldgard VTPro Corn	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects	Raw material for feed	Pending Ministry of Social Protection's approval for food since 12/17/2007
Yieldgard VT3Pro Corn	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects		Pending Ministry of Social Protection's approval for food since 04/23/2009
Yieldgard VTPro Corn X Roundup Ready 2	COACOL-Monsanto (United States)	Resistant to a wider variety of lepidopterous insects and tolerant to Roundup herbicide		Pending Ministry of Social Protection's approval for food since 04/23/2009
CCR corn	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects and tolerant to Roundup	Raw material for feed	Pending Ministry of Social Protection's approval for food

		herbicide		since 06/27/2008
CRW corn	COACOL-Monsanto (United States)	Resistant to rootworm		Pending ICA's approval for feed and CTN's Health for food.
Yieldgard+CCR corn	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects, rootworm and tolerant to Roundup herbicide		Pending ICA's approval for feed. Pending Ministry of Social Protection's approval for food since 09/26/2008
Lysine corn	COACOL-Monsanto (United States)	High lysine content		Pending ICA's approval for feed. Pending Ministry of Social Protection's approval for food since 06/27/2008
Bt 11 corn	Syngenta (Switzerland)	Resistant to some lepidopterous insects	Raw material for food	Approved on 4/13/2009
GA 21 corn	Syngenta (Switzerland)			Pending Ministry of Social Protection's approval for food since 04/23/2009
Bt 11 X GA 21 corn	Syngenta (Switzerland)			Pending Ministry of Social Protection's approval for food since 04/23/2009
Mon 89034 X TC1507 X MON 88017 X DAS59122-7	COACOL-Monsanto (United States)	Resistant to some lepidopterous insects, to root worm and tolerant to Roundup herbicide and to glufosinate.		Pending CTN's Health approval for food since 05/26/2009
MIR 162 corn	Syngenta (Switzerland			Pending CTN's Health approval for food since 05/05/2009

MON 87460 corn	COACOL-Monsanto (United States)	Tolerant to drought		Pending CTN's Health approval for food since 05/26/2009
Roundup Ready wheat *1	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide	Raw material for food	Approved on 3/29/2004
Roundup Ready soybeans	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide	Raw material for food	Approved on 12/9/2005
Roundup Ready 2Yield soybeans	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide		Pending ICA's approval for feed. Pending Ministry of Social Protection's approval for food since 06/27/2008
GAT Soybeans	Dupont (United States			Pending Ministry of Social Protection's approval for food since 04/23/2009
Roundup Ready sugar beet	COACOL-Monsanto (United States)	Tolerant to Roundup herbicide	Raw material for food	Approved on 12/9/2005
Liberty-link rice LLRice62, LLRice601	Bayer CropScience (United States)		Raw material for food	Approved on 9/26/2008 12/26/2008
Mice 3XTg AD	Universidad de Antioquia		Controlled health research	Approved on 7/30/2008
Mice ApoE-/- 6 Apoe "knock out"	Universidad de Antioquia		Controlled health research	Approved on 7/30/2008
Mice	Universidad de Antioquia			Pending CTN's Health approval for health research since 06/23/2009